

Plutonium Foot

Karl Krause

Krause grew up in a Lab family in the town of Livermore. He knows an old secret about the Lab pool, and he found a way to communicate with his dad even when he was at a remote test site in the Pacific Ocean.

my dad had a love for fast things. He had a lead foot—perhaps a plutonium foot. He drove like a madman, and he'd often use his knee to steer so he could do things with his hands. He wrecked more than his share of cars, including an occasional government vehicle. His name was Otto Krause, and there's even a stretch of a road at the Nevada Test Site named after him, called the Ottobahn.

He had emigrated from Vienna, fleeing the Nazi takeover of Austria. Later, he attended UC Berkeley, where he did his graduate work and worked on the cyclotron. As soon as Livermore opened, my father joined the Lab staff, so he was one of the first Lab employees.

For my father's entire career at the Lab, he did one thing and one thing only, which was diagnostics for nuclear shots. He was an event project engineer and group leader, among other things, but always with the same mission, to do diagnostics of weapons tests. He was always somewhere, setting up dozens of oscilloscopes that would capture data for a shot. It was some-

thing that he loved to do, and he was very good at it. He was meticulous, so he would spend hours, even entire nights before a shot, adjusting and calibrating and setting these things up, because you only got one opportunity. He was somewhat of a legend for doing that. But he did the same thing probably in the same division for his entire career, which spanned 36 years.

We were in the height of the Cold War when I was in school. I vividly remember doing duck-and-cover drills, bomb shelters were the big thing, and there were sirens in town. I remember as a child being terrified by the vision on television of Nikita Khrushchev banging the heel of his shoe at the podium at the United Nations saying, "We will bury you!"

When I was born, there were maybe 4,000 people in this town. As a youth, it maybe grew to a whopping 5,000 people. But fully half of the kids in school had parents who worked at the Laboratory. There weren't very many things to do in Livermore, none of which the kids today would find exciting. One form of recreation was to go to Seven Sisters, a portion of Greenville Road just south of the Lab that was made up of essentially seven very steep hills. It was a local attraction, and we'd do this on a



Photographers captured this conversation between Otto and his son Karl in 1958, shown in the photo above and on opposite page. From Bikini Island at Radiation Laboratory station KX6CH, Otto Krause (right) talks to Karl. Bob Werner sits to the left of Otto.

Saturday or a Sunday afternoon. Knowing the way my father drove, you can imagine the trips we would take. He would take us out to the end of East Avenue in his black and yellow '56 Oldsmobile, take a right on South Greenville, and then *floor* it.

But for the most part, my father was gone, working at the Nevada Test Site or in some remote location for a test. One thing that made it easier, though, was the way that we communicated with our parents when they were away. Most of the fellows back then were interested in electronics engineering, so many of them were interested in ham radio. There weren't telephones and, of course, no satellites to relay messages. If there was a shot at Christmas Island or Easter Island, we would communicate with them via ham radio. At a predetermined time, family members would go to the home of a ham radio operator who was a Lab employee, and we would get to talk to our parents that way. From time to time, they would send us Teletype messages, too.

Having a dad as a Lab employee definitely had its benefits. For one thing, my father loved to swim, and eventually, he became the Lab pool director. As pool director, he got to make some hiring decisions, and one of his first decisions (besides fighting to get the

roof over the pool uncovered) was to hire my brother and me to vacuum the pool. The best part of that job, though, had nothing to do with the work. Most people don't know that there's a tunnel underneath the pool, with windows that look into the pool, and camera mounts, which were used back in the airfield days to film the pilots' ditch and recovery training. My brother and I were very familiar with that tunnel. On weekends, we'd climb down the hatch, make our way to the tunnel, and peer out the windows so we could watch the girls swim by.

Eventually my mother, Adi, came to work at the Lab as a Technical Information Department photographer. But for a long time, I never considered following my parents' footsteps and becoming a Lab employee. I did become an engineer, but I went off in another direction. It wasn't until the father of a childhood friend suggested that I apply at the Lab that I started thinking about it. I joined the Lab in 1980, and I enjoyed a few years of seeing my dad on a daily basis until his retirement.

My father died in 1990. In 1999, I was occupying an office close to my dad's old office in Building 131. Several people had occupied it since he retired, ending with one gentleman

who was in it for several years. When he retired, he came over to my office. "Here, I think you should have this," he said, and handed me a slide rule. I opened the case, and inside was written the name of its owner: "Otto Krause."



While back in Livermore, Karl Krause sits on his mother Adi's lap and talks to his dad. Assisting them is Jim Ruys.